Industry Meeting: ***SC-186 WG4 ASSAP MOPS***

No.	Item	Assignee	Date Due	Open / Closed	Comments	Solution
3	Develop/discuss filtering constraints (e.g., number, range, altitude, vertical height) as relate to the LA Basin 2020 scenario and projected traffic densities. Note: Neither Mike Castle (APL) or Larry Bachman (APL) were in attendance. The individuals were volunteered without their knowledge or consent. Determine the traffic count applying various filters to the 234 targets to elimiate targets moving away, etc.	Randy / APL	March '07	Open	This issue was discussed at Group Meeting #2. No conclusions were made. Action items were created related to this issue. Excerpt from group meeting minutes #4, "Regarding tracking capacity requirements. A minimum tracking of 120 targets from Randy's presentation (ASSAP-WP08-12) is suggested. Performance requirements are also needed on which 120 targets have to be tracked. For example: ASSAP shall track a minimum of the most relevant 120 targets. More performance requirements should be considered."	
5	Provide a white paper which discusses processing options related to the selection of ADS-B/TCAS tracks for tracks pairs that spatially correlate, do not spatially correlate. Scenarios to discus the advantages/disadvantages of displaying TCAS/ADS-B, the advantage/disadvantages of providing ASA applications the ASAS track if not correlated with TCAS.	Tom Eich	March '07	Open	The following was discussed at Group Meeting #2. All agreed that when integrated with a TCAS system, you need to verify that the ADS-B track does not compromise the intended saftey of the TCAS system. A spatial window was proposed. More discussion is needed on this issue. Reference Issue I6	
9	Due to time limitations the presentation was not completed. Slide 35 identified Latency/Performance Issues which are to be reviewed by the next ASSAP meeting in June. • Latency for the combination of ASSAP and the CDTI shall (R3.210) be less than 400 ms for targets that are used by coupled applications, targets against which there is an alert, and the 10 highest priority targets. • Latency for the combination of ASSAP and the CDTI shall (R3.210) be less than 1 second for targets which are not intended for coupled applications, have no active alerts, and are not included in the highest 10 priority targets. • Track estimation shall (R3.188) extrapolate all established tracks to a common time within one-second of delivery to ASA applications or the CDTI interface. • The tracking function shall (R3.178) terminate a track when the maximum coast interval has been exceeded for all of the applications for which the track is potentially being used. • The maximum latency of the navigation data outputs to the ASA system will be less than 2 seconds (ASA MASPS, Page 144) • Selected App, Selected Target, flight crew selections, etc. • TCAS availability when ASSAP is failed?	Larry Bachman -Jonathan Hammer & Joel Wichgers will Assist	March '07	Open	R3.210 is open for modification in the ASA MASPS. An issue paper is needed to change these values since they are shall requirements in the ASA MASPS. Reference Issue SP7, SP8, SP9.	
16	Is the selection of an application external to the ASSAP?	Don	March '07	Open	Reference Issue I2	
18	When is a TCAS symbol shown on the CDTI?	Tom E.	March '07	Open	When do we send more than one target report to the CDTI when we don't correlate? Do we need to send target type?	
46	Perform ADS-B availability studies in regards to NIC and SIL.	Don	March '07	Open	Pending application studies. One application at a time. Issue paper needs to be written to address any issues with the integrity and accuracy thresholds in the ASA MASPS.	

Industry Meeting: ***SC-186 WG4 ASSAP MOPS***

No.	Item	Assignee	Date Due	Open / Closed	Comments	Solution
52	The CDTI and ASSAP group agreed that the application selection issue needs further discussion. Two proposals from Jonathan and Sethu will be further discussed. (Choosing the quality metrics for how to depict the target)	Jonathan, Sethu, Don	March '07	Open	See Issue I2. Coordination meeting with CDTI. Also Reference AI#16	
54	The CDTI group will provide the minimum number of traffic required to display to the ASSAP group. This number will drive the minimum number of traffic required for ASSAP to send to the CDTI.	CDTI Group		Open		
65	Randy's presentation (ASSAP-WP08-12) determined that the CD application's altitude coverage volume should be +/-20,600 ft instead of +/-15,600 ft as defined in the ASA MASPS. APL will verify how the ASA MASPS determined the coverage to be +/-15,600ft. Changing the requirement from the ASA MASPS needs to be considered. If so, then a white paper is required to deviate from the ASA MASPS requirements.	APL	May '07	Open	Reference group meeting minutes #4. Randy will talk with Ganghuai to close this issue.	
66	Re-evaluate the velocity accuracy thresholds in the ASA MASPS for the CD application.	MITRE		Open	Reference group meeting minutes #4. Jonathan will contact Joel regarding details of this action item.	
71	Last year the ASSAP group received a draft copy of a SCRSP document "Standards for traffic displays that include ACAS tracks" prepared by Ken Carpenter. Don Walker has an action item to contact Ken Carpenter at the next ICAO meeting in regards to the status of this document.	Don Walker		Open	Reference group meeting minutes #5.	
72	The ASSAP group has agreed to refer to "Selected Traffic" as "Highlighted Traffic". Tom Eich has an action item to create an issue paper since this is a deviation from the ASA MASPS.	Tom Eich	May '07	Open	Reference group meeting minutes #5.	
73	Investigate the implications of using relative geometric alt for traffic when pressure alt is unavailable. Currently the ASA MASPS allows relative alt for traffic to be calculated by either pressure or geometric altitude.	Dean	March '07	Open	Reference group meeting minutes #5.	
74	ASSAP will send traffic vertical rate values to the CDTI. The CDTI will use this value to calculate traffic vertical sense (decreasing or increasing). For example, TCAS uses +/- 500 fpm for this calculation. The first source for vertical rate from traffic is GNSS based. This may be a problem since aircraft usually fly pressure. Sheila Conway has an action item to investigate if GNSS vertical rate is acceptable for this calculation.	Dean	March '07	Open	Reference group meeting minutes #5.	
78	Need quantization values soon from MITRE. For TSO C129 and C145, quantization numbers are needed for NIC and NAC values between 5 and 9; total of 20.	MITRE		Open	Reference group meeting minutes #5. Don will provide Chris some assumptions.	
80	ACSS and Honeywell have an action to perform some timing analysis for ASSAP and the CDTI with their existing equipment. MITRE also has a similar action with their ASSAP simulation. This information will help determine the latency requirements for ASSAP. An issue paper may have to be written if the requirement deviates from the ASA MASPS which is 0.4 seconds from the input of ASSAP to the output on the CDTI display (between E-G).	Don W., Tom E, Robert E.		Open		

Industry Meeting: ***SC-186 WG4 ASSAP MOPS***

No.	Item	Assignee	Date Due	Open / Closed	Comments	Solution
81	The ASA MASPS has a stringent 0.4 second latency requirement from the input of ASSAP to the output on the CDTI display (between E-G) for the ASSA/FAROA and CD applications. Jonathan will determine why the value of 0.4 seconds was chosen.	Jonathan H.		Open		
82	Jonathan and Don have an action to flag the duplicate address issue at the next May 17th Plenary. The ASSAP group's stance is to not handle this issue in the ASSAP function.	Don W., Jonathan H.		Open		
83	In regards to the data collecting effort, will the recorded ADS-B 1090 and TCAS reports be time stamped? Also what is the time stamp referenced too; UTC is desired?	ACSS, Honeywell		Open		
84	In regards to the data collecting effort, when can ACSS and Honeywell provide the necessary equipment to the FAA Tech Center to support flight test?	ACSS, Honeywell		Open		
85	In regards to the data collecting effort, establish a set of parameters that need to be recorded.	Robert E., Randy S.		Open		
86	In regards to the data collecting effort, identify required aircraft configuration for test to the FAA Tech Center.	Michael P., Randy S., Tom E., Ruy B.		Open		
87	In regards to the data collecting effort, are there any proprietary/legal/restriction issues with providing ACSS and Honeywell equipment and information to the FAA Tech Center and ASSAP group?	ACSS, Honeywell		Open		
88	In regards to the data collecting effort, provide test cards for each of the participating aircraft.	Robert E., Michael P., FAA Tech Center Staff		Open		
89	In regards to the data collecting effort, create tools to transform the recorded data to a format for input to the simulation/model.	Robert E.		Open		
90	How many tracks can be generated by typical RF generator tools? This number will determine the number of tracks used in the MOPS test scenarios. A number of 200 is desired.	Tom E., Don W.		Open		
91	Create an issue paper to relax the own-ship quality requirements from what is defined in DO-257. Based on an accuracy of about 5.02m for the airport map, more allocation can be given to the own-ship quality requirements. Don is planning to justify the own-ship accuracy requirement from a NACp of 9 to 8. This does not affect the accuracy requirements for the traffic.	Don W.		Open		
92	What are the latency requirements/issues for TCAS tracks? TCAS latency also needs to be considered between ASSAP and the CDTI.	Don W.		Open		
93	Write an issue paper against DO-289 for the end-to-end latency requirements for ASSA/FAROA and CD.	Jonathan W.		Open		